

2. amends independent claim 19 from that appearing in the January 13th Examiner's Amendment.

1. (Previously presented in the January 13th Examiner's Amendment) A digital logger system adapted for receiving and recording audio telecommunication signals, the digital logger system comprising: a multichannel interface circuit for concurrently and continuously receiving audio telecommunication signals for at least two telephone calls, and for continuously transmitting digital audio data extracted from the received audio telecommunication signals, the multichannel interface circuit including:

- a. line interfaces, equal in number to the number of telephone lines from which the multichannel interface circuit receives audio telecommunication signals, for electronically conditioning the received audio telecommunication signals; and
- b. at least one Coder and DECoder ("CODEC") which receives conditioned audio telecommunication signals from the line interfaces for converting the received audio telecommunication signals into digital audio data, and for transmitting the digital audio data;

a Universal Serial Bus ("USB") hub for receiving the digital
20 audio data continuously transmitted from the multichannel interface
circuit, and for transmitting the digital audio data to a USB root
hub; and

a personal computer ("PC") having the USB root hub that is
coupled to the USB hub, and which:

25 receives the digital audio data transmitted from the USB
hub; and

executes PC software that continuously monitors the
received digital audio data for:

decoding line status and signaling information
30 embedded in digital audio data to determine status of a
telephone line including a telephone line "going off
hook;" and

upon detecting a telephone line "going off
hook," recording both:

35 an audio header that stores information
about a telephone call; and

an audio file that stores compressed
digital audio data for the telephone call.

2. (Canceled)

3. (Previously presented in the January 13th Examiner's Amendment) The digital logger system of claim 1 wherein the CODEC is a stereo analog CODEC which simultaneously converts two separate received audio telecommunication signals into two separate
5 digital audio data, and transmits both of the digital audio data to the USB hub.

4. (Previously presented in the January 13th Examiner's Amendment) The digital logger system of claim 1 wherein the CODEC is a linear Pulse Code Modulation ("PCM") CODEC.

5. (Canceled)

6. (Original) The digital logger system of claim 1 wherein the PC software includes a search engine which upon decoding of Dual-Tone Multifrequency ("DTMF") signaling for a telephone call initiates a real-time reverse-lookup which accesses
5 publicly accessible directories and business information.

7. (Original) The digital logger system of claim 1 wherein the PC software includes a search engine which upon decoding of Automatic Number Identification ("ANI") {also known as

Caller ID ("CID")) for a telephone call initiates a real-time
5 reverse-lookup which accesses publicly accessible directories and
business information.

8. (Original) The digital logger system of claim 1
wherein the PC software includes a search engine which upon
decoding of Automatic Location Identification ("ALI") for a
telephone call initiates a real-time reverse-lookup which accesses
5 publicly accessible directories and business information.

9. (Original) The digital logger system of claim 1
wherein upon the PC software detecting a telephone line "going off
hook," the PC software transmits digital audio data to the
multichannel interface circuit which causes the multichannel
5 interface circuit to transmit an audible announcement to a caller
via that telephone line.

10. (Previously presented in the January 13th Examiner's
Amendment) A signal processor adapted for use with a PC that
includes a USB root hub, and that executes PC software for
continuously monitoring digital audio data received via the USB
5 root hub of audio telecommunication signals, the PC software:

decoding line status and signaling information embedded
in digital audio data to determine status of a telephone line
including a telephone line "going off hook;" and

upon detecting a telephone line "going off hook,"

10 recording both:

an audio header that stores information about
a telephone call; and

an audio file that stores compressed digital
audio data for the telephone call;

15 the signal processor comprising:

a multichannel interface circuit for concurrently and
continuously receiving audio telecommunication signals for at least
two telephone calls, and for continuously transmitting digital
audio data extracted from the received audio telecommunication

20 signals, the multichannel interface circuit including:

a. line interfaces, equal in number to the number of
telephone lines from which the multichannel interface
circuit receives audio telecommunication signals, for
electronically conditioning the received audio telecommu-
25 nication signals; and

b. at least one CODEC which receives conditioned audio
telecommunication signals from the line interfaces for

converting the received audio telecommunication signals
into digital audio data, and for transmitting the digital
audio data; and

a USB hub for receiving the digital audio data continuously
transmitted from the multichannel interface circuit, and for
transmitting the digital audio data to the USB root hub of the PC.

11. (Canceled)

12. (Previously presented in the January 13th Examiner's
Amendment) The signal processor of claim 10 wherein the CODEC
is a stereo analog CODEC which simultaneously converts two separate
received audio telecommunication signals into two separate digital
audio data, and transmits both of the digital audio data to the USB
hub.

13. (Previously presented in the January 13th Examiner's
Amendment) The signal processor of claim 10 wherein the CODEC
is a linear PCM CODEC.

14. (Canceled)

15. (Previously presented in the January 13th Examiner's Amendment) In a digital logger system adapted for receiving and recording audio telecommunication signals, the digital logger system including a PC which executes PC software that:

5 monitors digital audio data of audio telecommunication signals for line status and signaling information embedded in digital audio data to determine status of a telephone line including a telephone line "going off hook;" and
upon detecting a telephone line "going off hook," records
10 both:

an audio header that stores information about a telephone call; and

an audio file that stores compressed digital audio data for the telephone call,

15 the improvement comprising:

a search engine which, upon decoding of appropriate signaling information for a telephone call that is selected from a group consisting of DTMF signaling, ANI (also known as CID), and ALI, initiates a real-time reverse-lookup that accesses publicly
20 accessible directories and business information.

16. (Canceled)

17. (Canceled)

18. (Canceled)

19. (Currently amended) A digital logger system adapted for receiving and recording audio telecommunication signals, the digital logger system comprising:

a. an interface circuit that includes:

- i. a line interface for electronically conditioning the received audio telecommunication signal; and
- ii. a CODEC₇ for receiving the conditioned audio telecommunication signal, for converting the received audio telecommunication signal into linearly coded digital audio data, and for transmitting the linearly coded digital audio data extracted from the received audio telecommunication signal; and

b. a PC which:

- i. receives the linearly coded digital audio data transmitted from the interface circuit; and
- ii. executes PC software that monitors the received digital audio data for:

- 20 A. decoding line status and signaling information
 embedded in digital audio data to determine
 status of a telephone line including a tele-
 phone line "going off hook;" and
- 25 B. upon detecting a telephone line "going off
 hook," recording an audio file that stores
 digital audio data for the telephone call
 after first converting the linearly coded
 digital audio data into μ Law compressed digi-
 tal audio data.

20. (Previously amended) The digital logger system of
claim 19 wherein:

the interface circuit includes a USB hub for receiving the
digital audio data transmitted from the interface circuit, and for
5 transmitting the digital audio data to a USB root hub; and

the PC includes the USB root hub that is coupled to the USB
hub for receiving the digital audio data transmitted from the USB
hub.

21. (Canceled)

22. (Original) The digital logger system of claim 19 wherein the CODEC is a stereo analog CODEC which simultaneously converts two separate received audio telecommunication signals into two separate digital audio data for transmission from the interface
5 circuit to the PC.

23. (Previously presented in the January 13th Examiner's Amendment) A method for receiving and recording audio telecommunication signals, the method comprising the steps of:

- a. within a signal processor:
 - 5 i. concurrently and continuously receiving an audio telecommunication signal for at least one telephone call;
 - ii. electronically conditioning the received audio telecommunication signal;
 - 10 iii. converting the conditioned audio telecommunication signal into linearly coded digital audio data;
 - iv, continuously transmitting the linearly coded digital audio data extracted from the received audio telecommunication signals to a PC;
- 15 b. within the PC:
 - i. receiving the linearly coded digital audio data;

ii. continuously monitoring the received digital audio data:

iii. decoding line status and signaling information embedded in the continuously monitor digital audio data to determine status of a telephone line including a telephone line "going off hook;" and

iv. upon detecting a telephone line "going off hook," recording both:

A) an audio header that stores information about a telephone call; and

B) an audio file that stores compressed digital audio data for the telephone call.

24. (Canceled)

25. (Original) The method of claim 23 further comprising the step of, upon decoding DTMF signaling for a telephone call, initiating a real-time reverse-lookup which accesses publicly accessible directories and business information.

26. (Original) The method of claim 23 further comprising the step of, upon decoding ANI (also known as CID) for a telephone